

3.0 PROCUREMENT OF ITEMS/SERVICES FOR SUBCONTRACTORS/SUPPLIERS

The *QAP* establishes the QA requirements for FDF and all other contractor and subcontractor organizations performing work at the FEMP. The *QAP* identifies and describes the integral elements of the QA activities that apply to the broad spectrum of work performed by FDF and its contractors and subcontractors for all activities associated with the FEMP. Major work activities associated with the FEMP are: remedial investigation/feasibility study, removal site evaluations, removal actions, remedial design, remedial actions, Resource Conservation and Recovery Act (RCRA) activities, construction, waste management, safe shutdown, program management and support activities, and landlord activities.

Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.

These prospective suppliers are to be evaluated to ensure that only qualified suppliers are selected that meet the requirements of the *QAP* and/or the Quality Levels. The prospective suppliers shall be evaluated to verify their capabilities to meet performance and schedule requirements. Measures for evaluating and selecting suppliers may include:

- a review of the supplier's history for providing identical or similar items or services;
- an assessment of the supplier's capability based on evaluation of its facilities, personnel, and programs; and/or
- an evaluation of documented qualitative and quantitative information provided by the supplier.

3.1 OVERALL METHOD OF APPLYING QUALITY ASSURANCE REQUIREMENTS

The Purchaser may incorporate into the procurement documents a complete quality assurance program standard, such as the *QAP*, and require the Supplier to apply the requirements of the *QAP* as appropriate to the items and services being procured. Items and services (this includes items and services from subcontractors and suppliers) must meet established requirements and perform as expected.

It is left to the contractor to determine the methods for ensuring that procured items and services meet requirements and perform as expected. The procurement documents should clearly state test/inspection requirements and acceptance criteria for purchased items and services. Procurement documents should include any specifications, standards, and

other documents referred to by the design documents. Critical parameters and requirements such as submittals, product related documentation, nonconformance requirements, administrative documentation, personnel or materials qualification, tests, inspections, and reviews should be specified as line items.)

At Quality Levels 1, 2, or 3, an adequate amount of resources are applied to implementation of the QA requirements, as defined in project specific plans or purchase orders. These resources shall include the following as applicable or others that are deemed necessary to ensure that items and/or services provided by suppliers meet the requirements and expectations of the end-user: source verification, receipt inspection, pre-installation and post-installation tests, design, inspection and acceptance testing or a combination of these or other methods).

Quality Level 4 is not intended to implement all of the QA program requirements for site facilities/activities. At this level, an adequate amount of resources are applied to implementation of the QA requirements, as defined in project specific plans or purchase orders. These resources may include the following: source verification, receipt inspection, pre-installation and post-installation tests, design, inspection and acceptance testing or a combination of these or other methods.

3.2 UNIQUE METHOD OF APPLYING QUALITY ASSURANCE REQUIREMENTS

a) COMMERCIAL GRADE ITEMS

FDF shall establish and implement appropriate controls (Quality Level 4) for services and items for the selection, determination of suitability, evaluation, and also for the receipt of commercial-grade items to ensure that commercial-grade items perform as expected.

Quality Level 4 is not intended to implement the QA program requirements for site facilities/activities. At this level, an adequate amount of resources are applied to the implementation of the QA requirements, as defined in project specific plans or purchase orders. These resources may include the following: source verification, receipt inspection, pre-installation and post-installation tests, design, inspection and acceptance testing or a combination of these or other methods).

b) SOLE/UNIQUE SOURCE

The purchaser may incorporate into the procurement documents selected portions of a quality assurance standard, such as the

QAP, that are unique to the items or services being procured.

For example, when the Purchaser's order is limited to design work only, the following could be applicable:

CRITERION 1 - PROGRAM
CRITERION 3 - QUALITY IMPROVEMENT
CRITERION 4 - DOCUMENTS AND RECORDS
CRITERION 5 - WORK PERFORMANCE
CRITERION 6 - DESIGN
CRITERION 10 - INDEPENDENT ASSESSMENT

At Quality Levels 1, 2, or 3, an adequate amount of resources are applied to implementation of the QA requirements, as defined in project specific plans or purchase orders. These resources shall include the following as applicable or others that are deemed necessary to ensure that items and/or services provided by suppliers meet the requirements and expectations of the end-user: source verification, receipt inspection, pre-installation and post-installation tests, design, inspection and acceptance testing or a combination of these or other methods.

c) **MINORITY CONTRACTS/SMALL DISADVANTAGED BUSINESSES**

Quality Levels 1, 2, 3 , or 4 are applicable to Minority Contracts and Small Disadvantaged Businesses. Quality Level 3 is the basic Quality Management System that implements the QA Program requirements (10 criteria) of 10 CFR 830.120 and is applicable to these firms. Procurement and contracts for items and services to these firms shall request the firms to establish and implement a program to ensure that the purchased items and services meet established requirements and perform as expected.

For those firms that do not have a QA Program that meets the *QAP* and the Quality Level requirements or do not have the resources to develop them, these firms shall be evaluated for programs in place and/or for those that can be developed to comply. FDF may furnish program services to augment those of the MINORITY CONTRACTS AND SMALL DISADVANTAGED BUSINESSES to meet the requirements of the *QAP* such as the following: source verification, receipt inspection, pre-installation and post-installation tests, design, inspection and acceptance testing or a combination of these or other methods).

**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS***

1.0 INTRODUCTION

The details of the application of various safety and other program requirements such as safety analysis, readiness reviews, configuration management, quality assurance, and conduct of operations to project planning, design and operation should follow a so called "Graded Approach". The purpose of the graded approach is to relate the extent of the application of the program and therefore the associated effort to that which would have an added value in terms of improved safety or level of assurance for the successful conduct of an activity.

There is a need for establishing categories of facilities, activities, structures, systems, and components so that rules or requirements for the application of any particular program can be established and applied uniformly. The categorization rules must be applicable at two levels: entire Facilities or Activities and the Systems, Structures, and Components (SSC) that make up the Facility or are used in the Activity. A Facility or Activity category is utilized for grading the application of such things as safety analysis, design controls and readiness reviews while a SSC category is used for such things as configuration management and quality control. For some functional areas both levels of categorization might be needed. For example, there is a need to define quality assurance requirements at an overall project level as well as at a detailed SSC level.

Since the major application of the graded approach is in the area of safety, the basic categorization is built along safety impacts. Facility or Activity categories are adequately defined by hazard category defined in DOE 5480.23 (Safety Analysis Reports), DOE 5481.1B (Safety Analysis and Review System), and DOE-STD-1027-92 (*Guidance on Preliminary Hazard Classification and Accident Analysis Techniques for Compliance with DOE Order 5480.23 "Safety Analysis Reports"*), with the addition of further guidance for below Category 3 and Standard Industrial Hazard.

While categorization for SSC can parallel and overlap the hazard categories additional detail is needed to allow for the fact that every SSC in a facility is not as important as every other. While it is obvious that individual SSC may have lower importance to safety than implied from the overall hazard category, it is less obvious, but true, that certain SSC may need tighter controls than is obvious from the hazard category alone.

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**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS (continued)***

2.0 FACILITY/ACTIVITY HAZARD CATEGORIES OR HAZARD CLASSES

The Nuclear Safety Section of the Safety & Health Department shall determine the Hazard Category for Facilities/Activities at the FEMP in accordance with DOE Order 5480.23, *Nuclear Safety Analysis Reports*. The safety analysis documentation provides the rationale for determining the hazard category for that Facility/Activity.

Facility, as used here, is intended to be all inclusive and to include activities and projects, as well as physical facilities. A project may include several activities which may take place in several buildings (or facilities). The boundaries to be utilized in the hazard categories depends on the nature of the activities (intended for a common specific purpose) and their physical proximity. Totally unrelated activities in close proximity may need to be considered together if one could effect the other.

2.1 For "Nuclear Facilities" or a facility which has a radiological inventory above a specified threshold (40 CFR 302.4 Appendix B) or otherwise imposes a radiological hazard that must be controlled:

- (a) **Hazard Category 1:** A facility in which an unmitigated accident could have a significant offsite impact.
- (b) **Hazard Category 2:** A facility in which an unmitigated accident could have a significant onsite impact.
- (c) **Hazard Category 3:** A facility in which the unmitigated consequences of an accident are only locally significant.
- (d) **Radiological Facility:** A facility that does not meet or exceed the Hazard Class 3 threshold quantity values (DOE-STD-1027-92) but contain some quantity of radioactive material > Appendix B 40 CFR 302, *Protection of Environment*.

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**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS (continued)***

A Standard Industrial Hazard is a hazard of a type and nature that are routinely encountered in industry and are addressed by the implementation of consensus standards or OSHA or similar safety and health programs.

Note that facilities below Hazard Category 3 are classified as Radiological Facilities in DOE-STD-1027-92 and the requirements for Safety Analysis Reports for "Nuclear Facilities" are not applicable. The applicability of other "Nuclear Safety" orders must be made on a case by case basis.

- 2.2 For a "Non-nuclear Facility", or a facility which is not a nuclear facility but does contain hazardous material in excess of that specified in 40 CFR 302.4,
- (a) High Hazard Class: A facility where the hazards have the potential for onsite or offsite impacts to large numbers of persons or for major impacts to the environment.
 - (b) Moderate Hazard Class: A facility whose hazard presents considerable potential for onsite impacts to people or the environment but, at most, only minor offsite impacts.
 - (c) Low Hazard Class: A facility whose hazard presents minor onsite and negligible offsite impacts to people or the environment.
- 2.3 An Industrial Facility is a facility in which the hazards are limited to Standard Industrial Hazards.

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**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS (continued)***

**3.0 SYSTEMS, STRUCTURES, AND COMPONENTS (SSC) PERFORMANCE GRADE
CATEGORIZATION**

Engineering has overall responsibility for assigning Performance Grade (PG) Categories to SSCs, based on:

- nuclear and non-nuclear safety significance;
- project importance relative to the FDF Mission;
- design life of the SSC; and
- project complexity.

The Performance Grade categories are summarized in the flow-chart in Figure 1 and described in the following paragraphs category-by-category.

The categorizations presented here assume that the hazard categorization/classification, accident analysis, and identification of "safety" systems for facilities that store, handle or process radioactive and toxic materials have been performed and documented in accordance with applicable DOE orders and standards.

- (a) **Performance Grade 1:** A SSC shall be placed in a Performance Grade 1 (PG-1) if it is part of a "safety" system in a Hazard Category 1 (HC-1) or a High Hazard (HH) facility and whose failure fails a preventative or mitigative function necessary to insure that there is no unacceptable off-site risk.
- (b) **Performance Grade 2:** A SSC shall be placed in a Performance Grade 2 (PG-2) if it is part of a "safety" system in a Hazard Category 2 (HC-2) or a Moderate Hazard (MH) facility and whose failure fails a preventative or mitigative function necessary to insure that there is no unacceptable on-site risk.

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**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS (continued)***

- (c) **Performance Grade 3:** A SSC shall be placed in PG-3 if it is not covered under PG-1 or PG-2, and if any of the following conditions apply:
 - a) The SSC is part of a "safety" system in a HC-3 or Low Hazard (LH) facility and whose failure fails a preventative or mitigative function necessary to insure that there is no unacceptable risk to project workers, and;
 - b) The SSC failure by itself or in combination with one or more SSCs may result in loss of function of emergency handling, hazard recovery, emergency preparedness, or emergency power system that may be needed to preserve the health and safety of the facility workers, collocated workers, and visitors.
- (d) **Performance Grade 4:** A SSC that is not covered under PG-1, PG-2, or PG-3 shall be placed in PG-4 if any of the following conditions apply:
 - a) The SSC failure may cause a life threatening situation to activity workers or collocated workers, or
 - b) a SSC is required to prevent or mitigate a Standard Industrial Hazard (SIH), or
 - c) a SSC is part of a monitoring system that monitors compliance with regulatory imposed release limits.
- (e) **Performance Grade 5:** A SSC that is not covered under PG-1 through 4 may be placed in PG-5 if is not important because of safety, mission, or cost considerations, except that a SSC whose failure may have an adverse effect on the performance of a PG-1, PG-2, PG-3, or PG-4 or SSC shall not be placed in PG-5.

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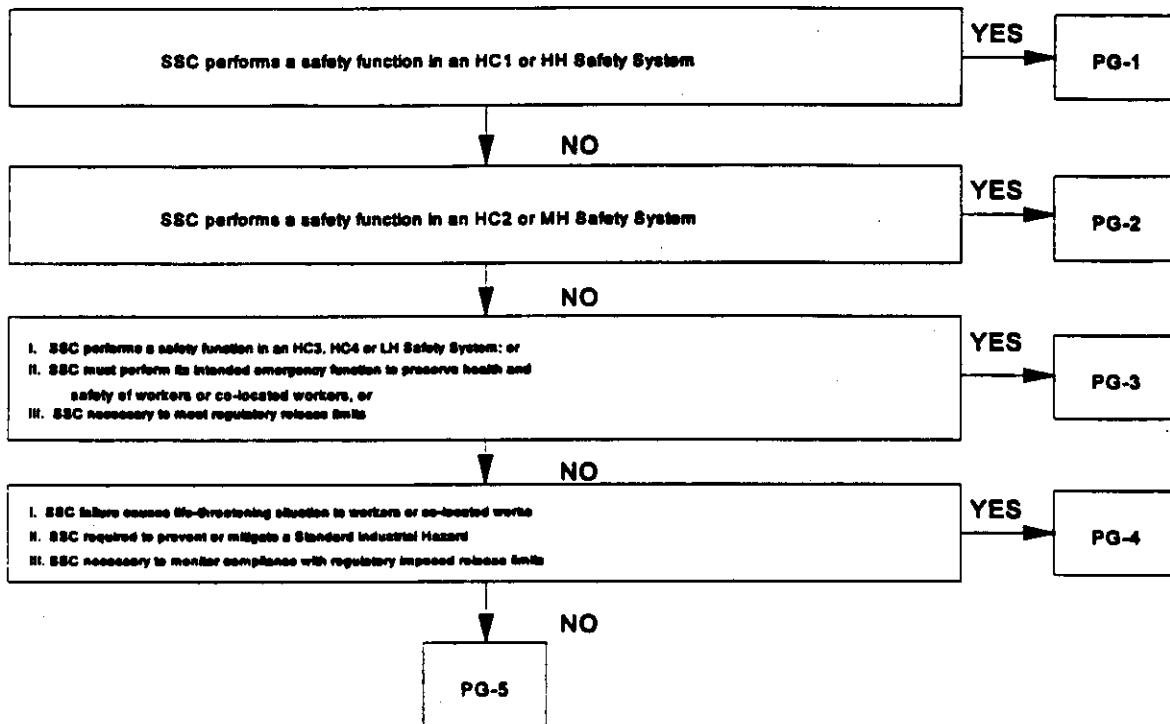
**CATEGORIZATION CRITERIA FOR FACILITIES/ACTIVITIES
AND SYSTEMS, STRUCTURES, AND COMPONENTS (continued)***

4.0 ASSIGNMENT OF QUALITY LEVELS TO CATEGORIES

FDF establishes Quality Levels based on Hazard Categories for Facilities/Activities and on Performance Grade Categories for Systems, Structures, and Components. These Quality Levels determine the appropriate level of effort FDF will allocate in order to assure quality. The relationship between Quality Levels to Hazard Categories and Performance Grade Categories are shown in Tables 1, 2, and 3 of Appendix D.

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FIGURE 1: Basic Guideline for Performance Grade
Categorization of Structures, Systems, and Components



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QUALITY ASSURANCE PROGRAM

APPENDIX D2

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Effective Date: 11/30/97

APPLICATION OF QUALITY LEVELS TO QA PROGRAM CRITERIA
<.....> Lowest Level of Assigned Resources

CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
Q.0 Quality Level Definition and Applications	<p>Definition: This Quality Level includes the basic Quality Management system of Quality Level 2 plus the additional resources and vigor necessary for control and protection due to the <u>Higher Risks and/or Hazards</u>.</p> <p>The Quality Level is generally applied to:</p> <ul style="list-style-type: none"> • Facilities/activities which are categorized as Hazard Category 1 or High Hazard Class or 10. • Systems, Structures, and Components which are categorized as Performance Grade 1. <p>They are described below and in the QAP, Tables 1.2.3, and Attachment D1.</p>	<p>Definition: This Quality Level includes the basic Quality Management system of Quality Level 3 plus the additional resources and vigor necessary for control and protection due to the <u>Higher Risks and/or Hazards</u>.</p> <p>This Quality Level is generally applied to:</p> <ul style="list-style-type: none"> • Facilities/activities which are categorized as Hazard Category 2 or Moderate Hazard Class or 10. • Systems, Structures, and Components which are categorized as Performance Grade 2. <p>They are described below and in the QAP, Tables 1.2.3, and Attachment D1.</p>	<p>Definition: This is the basic Quality Management System that implements the QA Program requirements (10 Criteria) of 10 CFR 830.120. This Quality Level addresses the <u>basic hazards and risks associated with DOE Nuclear/Hazardous facilities or activities that are part of a Safety System</u>.</p> <p>This Quality Level is generally applied to:</p> <ul style="list-style-type: none"> • Facilities/activities which are categorized as Hazard Category 3 or Low Hazard Class or 10. • Systems, Structures, and Components which are categorized as Performance Grade 3. <p>They are described below and in the QAP, Tables 1.2.3, and Attachment D1.</p>	<p>Definition: This Quality Level is not intended to implement the QA program requirements for site facilities/activities.</p> <p>At this level, an adequate amount of resources are applied to implementation of the QA requirements, as defined in the purchase order.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described below and in the QAP, Tables 1.2.3, and Attachment D1.</p> <p>APPLICATION:</p> <p>Facility or Activity</p> <ul style="list-style-type: none"> • Nuclear Hazard Category • HC3 • Non-Nuclear Hazard • LH <p>Systems, Structures, Components</p> <ul style="list-style-type: none"> • Performance Grade Category • PG-2 • PG-3 <p>APPLICATION:</p> <p>Facility or Activity</p> <ul style="list-style-type: none"> • Nuclear Hazard Category • HC2 • HC1 • Non-Nuclear Hazard • NH <p>Systems, Structures, Components</p> <ul style="list-style-type: none"> • Performance Grade Category • PG-1 <p>APPLICATION:</p> <p>Facility or Activity</p> <ul style="list-style-type: none"> • Nuclear Hazard Category • HC2 • Non-Nuclear Hazard • NH <p>Systems, Structures, Components</p> <ul style="list-style-type: none"> • Performance Grade Category • PG-1

NOTE 1: Since Facilities/Activities differ in scope, safety significance, risk and general requirements, the Programs defined for each Quality Level and each Criteria are provided as both prescriptive guidance and broad-based requirements. Program managers are expected to develop their management systems based on this information and on other requirements unique to their process. In order to ensure consistency and compliance with the Implementation Plan, QA shall review and approve the QA management system.

NOTE 2: Nucleic criteria are areas which lend themselves to the best application of graded resources. Program managers or subcontractors developing QA management systems at the designated Quality Levels should concentrate on applying appropriate levels of resources to these areas based on the complexity, risk and safety factor associated with their process.

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APPLICATION OF QUALITY LEVELS TO QA PROGRAM REQUIREMENTS	QUALITY LEVEL - 1	QUALITY LEVEL - 2	QUALITY LEVEL - 3	QUALITY LEVEL - 4	QUALITY LEVEL GRAPHICAL DESCRIPTION
PRIMARY AREA OF INCREASED RESOURCES FOR QUALITY LEVELS 1-3: <ul style="list-style-type: none"> • DETAILED DOCUMENTATION • TRAINING AND CERTIFICATION REQUIREMENTS • FREQUENCY OF REVIEW, INSPECTION, AND ASSESSMENT 	<small>ADDITIONAL RESOURCES AND VENDOR NECESSARY FOR CONTROL AND PROTECTION OF THE HIGHER RISKS AND HAZARDS</small> <small>PLUS</small> <small>CL-2</small>	<small>ADDITIONAL RESOURCES AND VENDOR NECESSARY FOR CONTROL AND PROTECTION OF THE HIGHER RISKS AND HAZARDS</small> <small>PLUS</small> <small>CL-3</small>	<small>THIS IS THE BASIC QUALITY MANAGEMENT SYSTEM THAT IMPLEMENTS THE QA PROGRAM REQUIREMENTS (10 CRF 50.54) AT THE QUALITY LEVEL. ADDRESSES THE BASIC HAZARDS AND RISKS ASSOCIATED WITH DOE NUCLEAR HAZARDOUS FACILITIES OR ACTIVITIES THAT ARE PART OF A SAFETY SYSTEM</small> <small>PLUS</small> <small>CL-4</small>	<small>THE QUALITY LEVEL IS NOT INTENDED TO IMPLEMENT ALL OF THE QA PROGRAM REQUIREMENTS (10 CRF 50.54) AT THIS LEVEL. AN APPROPRIATE AMOUNT OF RESOURCES ARE APPLIED AS DEFINED IN PROJECT-SPECIFIC PLANS OR PURCHASE ORDERS</small> <small>PLUS</small>	

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APPLICATION OF QUALITY LEVELS TO QA PROGRAM CRITERIA
 Greatest Level of Assigned Resources <-----> Lowest Level of Assigned Resources

Criteria Synopsis	Quality Level 1	Quality Level 2	Quality Level 3	Quality Level 4
1.0 Program Development, implementation, and maintain a written QAP that describes: <ul style="list-style-type: none"> - Organizational structure - Functional responsibility - Interfaces for those managing, performing, and assessing adequacy of work management system including planning, scheduling, and cost control considerations - Proper equipment, material, and resources available - Responsibility and authority to stop unsatisfactory work 	A formal program that implements all of the elements of Criteria 1. Example: FDF shall have highly detailed descriptions of the organizational interfaces with emphasis on the interactions and responsibilities of individuals and how they impact each other and the project.	A structural program that implements the elements of Criteria 1. Example: FDF shall have a brief description of the individuals in the organization and how they work together, i.e., a functional chart.	A brief but complete description that implements the elements of Criteria 1. Example: FDF shall have a brief description of the individuals in the organization and how they work together, i.e., a functional chart.	The Quality Level is not intended to implement the QA program requirements for site facilities/activities. At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.
2.0 Personal Training and Qualification <ul style="list-style-type: none"> • Personal Training • Training plans • Classroom training • Required reading 	A formal program that implements all of the elements of Criteria 2. Example: FDF, sub-contractors, and suppliers shall have documented detailed description of Qualification and Certification (if required) requirements, including: education, experience, training, written tests, and documented demonstrated proficiency.	A structural program that implements the elements of Criteria 2. Example: FDF, sub-contractors, and suppliers shall have a documented brief description of Qualification and Certification (if required) requirements, including: education, experience, training, written tests, and documented demonstrated proficiency.	A brief but complete description that implements the elements of Criteria 2. Example: FDF, sub-contractors, and suppliers shall have a documented brief description of Qualification and Certification (if required) requirements, including: education, experience, training, written tests, and documented demonstrated proficiency.	At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders. Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.
	<ul style="list-style-type: none"> • Qualifications requirements • Written tests • Demonstrated proficiency • Certification • Key personnel certified per appropriate standards 			This level is generally applied to services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.

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APPLICATION OF QUALITY LEVELS TO QA PROGRAM CRITERIA

Greatest Level of Assigned Resources <.....> Lowest Level of Assigned Resources

CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
3.0 Quality Improvement	<ul style="list-style-type: none"> • Corrective action program that implements all of the elements of Criteria 3 	<p>A formal program that implements the elements of Criteria 3.</p> <p>Example: FDF, suppliers and subcontractors shall conduct in depth investigation of non-conforming items and processes to identify the root cause and prevent recurrence.</p>	<p>A brief but complete description that implements the elements of Criteria 3.</p> <p>Example: FDF, suppliers and subcontractors shall complete investigation of non-conforming items and processes to identify the root cause and prevent recurrence.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p>
3.0 Quality Improvement	<ul style="list-style-type: none"> • Deviations - Items and processes identified, controlled, and corrected • Corrective - Identifying the causes of problems and preventing recurrence • Trend Analysis - Review home reliability, process implementation and other quality related information • Data analyzed to identify items and processes needing improvement 	<p>Example: FDF, suppliers and subcontractors shall conduct in depth, quarterly reviews and analysis of deficiencies and other quality information for trends that may identify items and processes needing improvement.</p>	<p>Example: FDF, suppliers and subcontractors shall conduct semi-annual reviews and analysis of deficiencies and other quality information for trends that may identify items and processes needing improvement.</p>	<p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p>
4.0 Documents & Records	<ul style="list-style-type: none"> • Documents - System to control preparation, review, approval, issuance, use, and retention to documents their establish policies, prescribe work, specify requirements, or establish design • Records - Process to ensure other records are specified, prepared, reviewed, approved, and maintained to accurately reflect completed work • Maintenance of records - System to include provisions for retention, protection, preservation, accessibility, and retrievability 	<p>A formal program that implements all the elements of Criteria 4.</p> <p>Example: FDF, suppliers and subcontractors shall document process activities and the completion of designated process steps. These records shall be reviewed and approved by management at the completion of each shift.</p> <p>Example: FDF, suppliers and subcontractors shall maintain protection and preservation facilities, such as: fireproof cabinets or duplicate records stored at separate locations.</p>	<p>A brief but complete description that implements the elements of Criteria 4.</p> <p>Example: FDF, suppliers and subcontractors shall document designated process activities and the completion of designated process steps. These records shall be reviewed by management.</p> <p>Example: FDF, subcontractors shall maintain controlled access for documents and records, that need not be in fire-proof cabinets or duplicate records stored at separate locations.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p>

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CRITERIA SYNOPSIS	APPLICATION OF QUALITY LEVELS TO QA PROGRAM CRITERIA		
	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3
6.0 Work Processes	<p>A formal program that implements all of the elements of Criteria 5.</p> <p>Example: FDF, subcontractors, and suppliers procedures shall be developed and documented for anticipated activities, detailing specific direction for each element of the task. Operator qualification and training shall be specified within the procedure.</p> <p>Items maintained to prevent their damage, loss, or deterioration.</p> <p>Equipment used for process monitoring or data collection are calibrated & maintained.</p>	<p>A structural program that implements the elements of Criteria 5.</p> <p>Example: FDF, subcontractors, and suppliers procedures shall be developed and documented for designated activities. Key elements of the task shall be described in brief. Operator shall be qualified to perform task.</p>	<p>A brief but complete description that implements the elements of Criteria 5.</p> <p>Example: FDF, subcontractors, and suppliers procedures shall be developed and documented for designated activities, detailing key elements of the task. Operator qualification and training shall be specified.</p>
			<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p>
			<p>Example: FDF, subcontractors, and suppliers shall develop and document a maintenance management program for material control, condition, and aging. Periodic inspection shall be performed annually (if required).</p>
			<p>Example: FDF, subcontractors, and suppliers shall develop and document a maintenance management program for material control, condition, and aging. Periodic inspection shall be performed quarterly.</p>
			<p>Program to identify, control, and maintain items, control consumables and items with limited shelf life, prevent the use of incorrect or defective items, and control samples. Identify and control items to ensure their proper use and traceability.</p> <p>Items maintained to prevent their damage, loss, or deterioration.</p>

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<... Greatest Level of Assigned Resources ...>

Lowest Level of Assigned Resources

CRITERIA SYNOPSIS	Greatest Level of Assigned Resources			
	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	
6.0 Work Processes (cont)	<p>Program to control the handling, storage, shipping, cleaning and preservation of items to prevent damage, loss, or deterioration.</p> <p>Marking and labeling of items maintained throughout packing, shipping, handling, and storage requirements established for offsite transportation. Special protective measures specified and provided when required to maintain acceptable quality.</p> <p>Low-level waste shipments to the Nevada Test Site Defense Waste Acceptance Criteria, Certification, and Transfer Requirements</p>	<p>Example: FDF, subcontractors, and suppliers shall develop and document a material management program for material control. Low-level waste shipments to NTS are QL-1.</p> <p>Periodic inspection shall be performed quarterly on material management.</p>	<p>Example: FDF, subcontractors, and suppliers shall develop and document a material management program for material control.</p> <p>Periodic inspection shall be performed annually on material management.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p>
			<p>Example: FDF, subcontractors, and suppliers shall develop and document a maintenance management program for measuring and test equipment.</p> <p>Periodic inspection shall be performed annually.</p>	<p>Example: FDF, subcontractors, and suppliers shall develop and document a maintenance management program for measuring and test equipment.</p> <p>Periodic inspection shall be performed annually.</p>

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CRITERIA SYNOPSIS	APPLICATION OF QUALITY LEVELS TO QA PROGRAM CRITERIA		
	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3
8.0 Design • Names/processes designed using sound engineering/scientific principles and appropriate standards	A formal program that implements all of the elements of Criteria 8.	Example: FDF, subcontractors, and suppliers shall have documented description of a Design program to establish processes and procedures to require that design work be based on sound engineering and scientific principles, and to prove control of design inputs and outputs, configuration changes and design changes, documentation and records, and interfaces.	A brief but complete description that implements the elements of Criteria 8.
Design/Changes incorporate applicable requirements & design bases • Design interfaces identified & controlled for the purpose of developing, reviewing, approving, releasing, distributing, and revising design inputs and outputs are to be defined Adequacy of design products • Adequacy of design products tested & validated by individuals or groups other than those who performed the work	Establish processes and procedures to require that design work be based on sound engineering and scientific principles, and to prove control of design inputs and outputs, configuration changes and design changes, documentation and records, and interfaces.	Example: FDF, subcontractors, and suppliers shall have documented description of a Design program to establish processes and procedures to require that design work be based on sound engineering and scientific principles, and to prove control of design inputs and outputs, configuration changes and design changes, documentation and records, and interfaces.	At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.

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Greatest Level of Assigned Resources <-----> Lowest Level of Assigned Resources				
CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
7.0 Procurement <ul style="list-style-type: none"> • Program to ensure that purchased items and services meet established requirements and perform as expected • Appropriate controls for the selection, determination of suitability, evaluation, and receipt of commercial-grade items to ensure that commercial-grade items performs as expected • Suppliers evaluated to ensure other only qualified suppliers are selected • Pre-Award Survey • Supplier Audit • Source Surveillance 	<p>A formal program that implements all of the elements of Criteria 7.</p> <p>Example: FDF, suppliers and subcontractors shall have a documented description of the Procurement program for purchasing items and services, evaluation of potential suppliers, and acceptance methods for procured items and services.</p> <p>Example: Pre-award surveys shall be conducted at suppliers prior to procurement. Thereafter, supplier audits shall be conducted at least once every three years. Lab services audits shall be conducted at least once each year. A satisfactory supplier audit for this quality level will satisfy the requirements for lower quality levels.</p> <p>Purchased items and services accepted using specified methods</p>	<p>A structured program that implements the elements of Criteria 7.</p> <p>Example: FDF, suppliers and subcontractors shall have a documented description of the Procurement program for purchasing items and services, evaluation of potential suppliers, and acceptance methods for procured items and services.</p> <p>Example: Pre-award surveys shall be conducted at suppliers prior to procurement (this may be accomplished with a desk-top audit, past performance review, etc.). A satisfactory supplier audit for this quality level will satisfy the requirements for lower quality levels.</p>	<p>A brief but complete description that implements the elements of Criteria 7.</p> <p>Example: FDF, suppliers and subcontractors shall have a documented brief description of the Procurement program for purchasing items and services, evaluation of potential suppliers, and acceptance methods for procured items and services.</p> <p>Example: Pre-award surveys shall be conducted at suppliers prior to procurement (this may be accomplished with a desk-top audit, past performance review, etc.). A satisfactory supplier audit for this quality level will satisfy the requirements for lower quality levels.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p> <p>Additionally, appropriate controls are to be in place for the selection, determination of suitability, evaluation, and receipt of commercial-grade items to ensure that commercial-grade items performs as expected.</p> <p>Example: Source surveillance, source inspection, pre-installation tests, and/or post-installation tests may be used to verify the quality of purchased items and services, as determined by the Quality Plan or as dictated by item or service quality concerns.</p> <p>Example: Source surveillance, source inspection, pre-installation tests, and/or post-installation tests may be used to verify the quality of purchased items and services, as determined by the Quality Plan or as dictated by item or service quality concerns.</p> <p>Before an item is used or placed in service, procurement, inspection, and test requirements are to be satisfied</p> <p>The quality of purchased items and services is to be verified at intervals and to a depth consistent with the complexity, risk, quantity, and procurement frequency of the items or services</p>

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 <.....> Lowest Level of Assigned Resources

CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
B.0 Inspection and Acceptance Testing Inspection per established criteria	A formal program that implements all of the elements of Criteria B.	A structural program that implements the elements of Criteria B.	A brief but complete description that implements the elements of Criteria B.	At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.

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CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
8.0 Inspection and Acceptance Testing (cont) <ul style="list-style-type: none"> • Acceptance testing per established criteria 	<p>Example: FDF, subcontractors, and suppliers shall have documented detailed Testing Processes to specify that items and processes will perform as intended.</p> <p>Test control program for acceptance testing to demonstrate that items will perform as intended.</p> <p>Program to include, as appropriate, bench tests and proof tests before installation, pre-operational tests, post-maintenance test, post-requalification tests, and operational tests.</p> <p>Personnel are not to test their own work for acceptance unless a third-party verification from a qualified third-party is obtained, where applicable.</p>	<p>Example: FDF, subcontractors, and suppliers shall have a documented brief description of Testing Processes to specify that items and processes will perform as intended.</p> <p>Administrative controls and status indicators for acceptance testing and operation of items or processes, test procedures, and an acceptance criteria.</p>	<p>Example: FDF, subcontractors, and suppliers shall have a documented brief description of Testing Processes to specify that items and processes will perform as intended, administrative controls and status indicators for acceptance testing and operation of items or processes, test procedures, and an acceptance criteria.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, test and inspection, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.</p>

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Criteria Synopsis	Quality Level 1	Quality Level 2	Quality Level 3	Quality Level 4
9.0 Inspection and Acceptance Testing (cont) Acceptance testing per established criteria (cont) For acceptance criteria not met, corrected, after areas are rejected, after being corrected, to original requirements	Equipment calibrated & maintained Program to control the calibration, maintenance, accountability, and use of equipment used to control any process.	Example: FDF, subcontractors, and suppliers shall have a documented description of Measuring and Testing Processes to control calibration, maintenance, accountability, and use of equipment used to control any process.	Example: FDF, subcontractors, and suppliers shall have a documented description of Measuring and Testing Processes to control calibration, maintenance, accountability, and use of equipment used to control any process.	At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders. Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents. This level is generally applied to: services or commercial-grade items which are not part of safety systems as described in the QAP, Appendix D.

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CRITERIA SYNOPSIS	QUALITY LEVEL 1	QUALITY LEVEL 2	QUALITY LEVEL 3	QUALITY LEVEL 4
9.0 Management Assessment <ul style="list-style-type: none"> • Planned & periodic assessments by senior management involving all levels of management • Management problems identified and corrected • Annual assessment of performance conducted by managers of each organization based on compliance and performance data from internal evaluations and independent assessments • Senior management conducts overall assessment of performance using results from the individual organization assessments 	<p>A formal program that implements all of the elements of Criteria 9.</p> <p>Example: FDF, subcontractors, and suppliers shall have documented detailed planned & periodic assessments performed by senior management at all levels of the program.</p> <p>Example: FDF, subcontractors, and suppliers shall have biannual assessment (if required) of performances which are conducted by managers of each organization based on compliance and performance data from internal evaluations and independent assessments performances.</p> <p>A formal program that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have documented detailed planned & periodic independent assessments performed by personnel qualified and knowledgeable with requirements of education, experience, and training.</p>	<p>A structural program that implements the elements of Criteria 9.</p> <p>Example: FDF, subcontractors, and suppliers shall have documented brief description of assessments (if required) performed by senior management at all levels of the program.</p> <p>Example: FDF, subcontractors, and suppliers shall have annual assessment (if required) of performances which are conducted by managers of each organization based on compliance and performance data from internal evaluations and independent assessments performances.</p> <p>A structural program that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have a brief description of independent assessments (if required) performed by personnel qualified (if required) and knowledgeable with requirements of education, experience, and training.</p>	<p>A brief but complete description that implements the elements of Criteria 9.</p> <p>Example: FDF, subcontractors, and suppliers shall have a documented brief description of assessments (if required) performed by senior management at all levels of the program.</p> <p>Example: FDF, subcontractors, and suppliers shall have annual assessment (if required) of performances which are conducted by managers of each organization based on compliance and performance data from internal evaluations and independent assessments performances.</p> <p>A brief but complete description that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have a brief description of independent assessments (if required) performed by personnel qualified (if required) and knowledgeable with requirements of education, experience, and training.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>The level is generally applied to: services or commercial grade items which are not part of safety systems as described in the QAP, Appendix D.</p> <p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>The level is generally applied to: services or commercial grade items which are not part of safety systems as described in the QAP, Appendix D.</p>
10.0 Independent Assessment <ul style="list-style-type: none"> • Planned & periodic assessments by an independent organization • Personnel technically qualified & knowledgeable in the areas assessed • Annual assessment of the effectiveness of the QA program 	<p>A formal program that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have documented detailed planned & periodic independent assessments performed by personnel qualified and knowledgeable with requirements of education, experience, and training.</p> <p>Annual assessment of the effectiveness of the QA program</p>	<p>A structural program that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have annual assessment (if required) of the effectiveness and adequacy of the QA program.</p>	<p>A brief but complete description that implements the elements of Criteria 10.</p> <p>Example: FDF, subcontractors, and suppliers shall have a brief description of independent assessments (if required) performed by personnel qualified (if required) and knowledgeable with requirements of education, experience, and training.</p> <p>Example: FDF, subcontractors, and suppliers shall have annual assessment (if required) of the effectiveness and adequacy of the QA program.</p>	<p>At this level, an adequate amount of resources are applied as defined in project specific plans or purchase orders.</p> <p>Applicable technical and administrative requirements (such as specifications, codes, standards, tests and inspections, and acceptance criteria) for procurement of items and services shall be clearly stated in the procurement documents.</p> <p>The level is generally applied to: services or commercial grade items which are not part of safety systems as described in the QAP, Appendix D.</p>

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KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 1 - PROGRAM

CM-0001	Configuration Management
ED-12-9001	Engineering Quality Management
EW-0010	FEMP Data Validation Procedure
FD-1000	Sitewide CERCLA Quality Assurance Project Plan (SCQ)
IM-6001	Safe Shutdown Program Planning and Implementation Manual
IM-6008	Technical Site Information
IM-6010	Defense Nuclear Facilities Safety Board (DNFSB)
IM-6011	Data Quality Objectives
IM-6016	FEMP Asbestos Control Program
IM-7001	Decontamination manual
IM-7006	Incident Building Evacuation Manual
MS-0006	Maintenance of Standards/Requirements Identification Documents (S/RID)
OP-1001	Operations Organization and Administration
PL-3022	Uranium Soils Integrated Demonstration: Site Characterization Demonstration Plan
PL-3028	Environmental Protection Implementation Plan
PL-3029	QA Rule Implementation Plan
PL-3034	Asbestos Program Quality Assurance Plan
PL-3035	Configuration Management
QA-0002	Quality Assurance Project Plans
QA-0003	Identifying Quality Assurance Program Requirements for Quality (RISK) Levels
QA-0009	Quality Assurance Job Specific Planning (QAJSP)
RM-0012	Quality Assurance Program
RM-0016	Management Plan FERMCO Policies and Requirements Manual
RM-0007	FEMP Respiratory Protection Requirements Manual
RM-0011	Control of Occupational Exposure of Bloodborne Pathogens
RM-0015	FEMP ALARA Requirements Manual
RM-0020	Radiological Control Requirements Manual
RM-0021	Safety Performance Requirements Manual
RM-0027	Nuclear Criticality Safety Requirements
RM-0028	FERMCO Project Control System Application Guide
RM-0029	FERMCO Conduct of Operations (CONOPS) Program

* The list of these key site documents which implement QA requirements is updated and maintained in RM-0016, Management Plan (FDF Policies and Requirements Manual), which takes precedence over the list provided here.

KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 1 - PROGRAM (contd.)

RM-0031	Asbestos Operations and Maintenance Work Practices
RM-0034	Startup and Turnover Requirements Manual
RM-2086	Chemical Hazard Communication Program
RM-2116	Safety Analysis Program Requirements
RM-3001	Laboratory Chemical Hygiene Manual

CRITERION 2 - PERSONNEL TRAINING AND QUALIFICATION

CT 1.3.1	Construction Training
CT 1.6.3	Welding Procedure - Qualification of Welders and Welding Operators
CT 3.1.2	Subcontractor Training and Badging
EM-0006	Emergency Preparedness Training Plan for Emergency Operations Center Staff
OP-0001	Qualification of HEPA Filtration System Test Personnel
OP-1005	Control of ON-Shift Training
OP-1013	Operations Aspects of Facility Chemistry and Unique Processes
OP-1014	Required Reading
OP-1017	Operator Aid Postings
PL-3032	Fernald Site Wide Training Plan
RM-0012	Quality Assurance Program
RM-0002	Training Department Program Manual
RM-0004	Technical Support Staff Selection, Training, and Qualification Program
RM-0025	FERMCO Occupational Readiness Manual
TR-0001	Exemption from Initial Training
TR-0002	Conducting a Job and Task Analysis
TR-0003	Instructor Qualification
TR-0004	Fernald Sitewide Training Procedure
TR-0005	Job/Procedure Briefings
TR-0006	Training Rosters
TR-0011	Extension of Qualification Procedure

CRITERION 3 - QUALITY IMPROVEMENT

ED-12-2004	Engineering Division Training
ED-12-9002	Value Engineering Process

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KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 3 - QUALITY IMPROVEMENT (contd.)

EM-0019	Sitewide Lessons Learned
EM-0010	Event Notification and Occurrence Reporting
EM-0025	Event Categorization/Classification Procedure
EM-0027	Root Cause Analysis Using System Improvements' Root Cause Tree
MS-1005	FERMCO Commitment Tracking System (CTS)
QA-0001	FERMCO Nonconformance identification and Tracking System
QA-0008	Quality Assurance Stop Work Authority
RM-0012	Quality Assurance Program

CRITERION 4 - DOCUMENTS AND RECORDS

CT 2.4.1	Construction Document Control
CT 2.4.2	Supplier Documents
CT 2.4.3	Records Management
CT 2.4.4	Construction Document Filing System
CT 3.1.4	Change Orders
CT 3.5.1	As-Built Drawings
CT 3.5.3	Request for Clarification of Information And Design Change Notice
ED-12-5001	Engineering Document Control
ED-12-5002	Engineering Design Change Process
ED-12-6002	Engineering Processing of As-Built Drawings
ED-12-4005	Calculation Preparation and Review Process
ED-12-4006	Specifications Preparation and Issue
ED-12-4007	Drawing Preparation
ED-12-4009	Process Flow Diagram Preparation and Issue
ED-12-1002	Preparation and Control of Engineering Procedures
EW-0008	Establishment and Maintenance of Administrative Record
EW-0015	FEMP RCRA Operation Record
EW-0016	Submittal of Documents to Administrative Record
ED-12-9004	Engineering Project Closeout
EP-0001	National Environmental Policy Act (NEPA) Document Process
FD-1000	Sitewide CERCLA Quality Assurance Project Plan (SCQ)
MS-0001	Maintaining the Management Plan: The FERMCO Policies and Requirements Manual
MS-0002	Records Management

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KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 4 - DOCUMENTS AND RECORDS (contd.)

MS-0003	Document Filing System
MS-1001	FERMCO Site Procedure System
MS-1002	Control of Plans and Internal Requirements Documents
MS-1006	FERMCO Forms Control System
OP-1011	Logkeeping
OP-1012	Operations Turnover
OP-1016	Operations Procedures Availability and Use Operator Aid Postings
RM-0012	Quality Assurance Program
RM-0022	FEMP Records Management Program Records Management Users Manual
RM-0032	FEMP Records Management Program Administrative Procedures

CRITERION 5 - WORK PROCESSES

CT 1.6.1	Welding Procedure - ASME Section IX
CT 1.6.2	Welding Procedure - AWS D1.1
CT 1.6.4	Welding Procedure - Control of Welding Consumables
CT 3.3.1	Daily Activity Reports
CT 3.3.4	Progress Photos and Videos
CT 3.4.1	Work Permit Requirements and Coordination
CT 3.4.3	Radiological Work Permit Requirements and Coordination
CT 3.4.4	Confined Space Evaluation/Permit and Chemical Hazardous Material Work Permit Requirements and Coordination
CT 3.4.6	Open Flame, Welding and Hazardous Work Permit Requirements and Coordination
CT 3.5.4	Field Surveying and Testing Services
CT 3.7.5	Control and Verification of Construction Support Contractor Work
CT 4.2.1	Asbestos Abatement
CT 4.2.2	Decontamination/Demolition Field Activities
EP-0004	Spill Incident Reporting and Clean-Up
EP-0005	Controlling Aqueous Wastewater Discharges into Wastewater Treatment System
EW-0002	Chain of Custody/Request for Analysis Record Sample Control
EW-0004	Satellite Accumulation Areas for Hazardous Wastes
EW-0005	Handling Containers of Unidentified Material
EW-0006	Management of Excess Soil, Debris, and Waste from a Project

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KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS***CRITERION 5 - WORK PROCESSES (contd.)**

EW-0012	Tank/Sump Contents Removal
EW-0013	Tank/Sump Removal or Abandonment
EW-0014	Managing PCB's and PCB Items
EW-0017	Management of Hazardous Waste
EW-0018	Management of Low-Level Waste
FD-1000	Sitewide CERCLA Quality Assurance Project Plan (SCQ)
MS-1021	Project Management
MT-0001	Measuring and Test Equipment Calibration and Control
MT-0003	FEMP Work Request/Order Procedure
OP-0002	Controlling Portable HEPA Filtration Devices (HFDs)
OP-0003	Control of Processes
OP-0004	FERMCO Lockout/Tagout Procedure
OP-1003	Control Area Activities
OP-1008	Control of Equipment and System Status
OP-1010	Independent Verification
PL-1002	Fernald Site Environmental Monitoring Plan
PL-2194	Fernald Environmental Restoration Management Corporation Spill Prevention Control and Countermeasure (SPCC) Plan
PL-3006	Materials Control and accountability (MC&A) Plan
PL-3010	FY-1992 Environmental Restoration and Waste Management Site Specific Plan
PL-3018	FEMP Asbestos Management Plan
PL-3048	Prototype Sampling and Analysis Plan for Containerized Materials at the FEMP
PL-3050	Prototype Sample and Analysis Plan for Surface Impoundment Materials at the FEMP
PT-0003	Control and Movement of Containers at the FEMP
PT-0005	Packaging Low-Level Radioactive Waste (LLRW) in Drums for Off-Site Shipment to NTS or DOE-NV
PT-0006	Packaging Low-Level Radioactive Waste (LLRW) in ISO Containers for Shipment to NTS or DOE-NV

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KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 5 - WORK PROCESSES (contd.)

- | | |
|---------|---|
| PT-0007 | Packaging Low-Level Radioactive Waste (LLRW) in Metal Boxes for Shipment to NTS or DOE-NV |
| PT-0009 | Contaminated Trash Dumpsters |
| PT-0010 | Collection and Disposal of Controlled Area Office Trash |
| PT-0011 | Evaluating Low-Level Radioactive Waste (LLRW) Bulk Waste Streams for Shipment to the Nevada Test Site |
| RM-0012 | Quality Assurance Program |
| RM-0005 | FEMP Lot Marking and Color Coding System |

CRITERION 6 - DESIGN

- | | |
|------------|---|
| ED-12-3001 | Engineering Design Initiation |
| ED-12-3002 | Collection, Verification, and Use of Engineering Data |
| ED-12-4002 | Conceptual Design Report |
| ED-12-4003 | Design Criteria Package |
| ED-12-4004 | Design Package |
| ED-12-4015 | Performance Grading |
| ED-12-7002 | Request for Engineering Services |
| ED-12-8001 | Design Activity Closeout |
| FD-1000 | Sitewide CERCLA Quality Assurance Project Plan (SCQ) |
| RM-0012 | Quality Assurance Program |

* The list of these key site documents which implement QA requirements is updated and maintained in RM-0016, Management Plan (FDF Policies and Requirements Manual), which takes precedence over the list provided here.

KEY SITE DOCUMENTS WHICH IMPLEMENT QA REQUIREMENTS*

CRITERION 7 - PROCUREMENT

AC-0001	Request for Purchase
AC-0002	Contract Administration
AC-0003	Initiating and Preparing a Technical Evaluation of a Proposal
AC-0004	Processing Unauthorized Contractual Commitments
CT 2.2.3	Pre-Bid Meetings
CT 2.2.2	Construction Requisitions
ED-12-2006	Engineering Acquisitions
ED-12-4011	Subcontractor Submittals
EW-1005	CRU Operating Procedures Acquisitions and Contracts
FD-1000	Sitewide CERCLA Quality Assurance Project Plan (SCQ)
RM-0012	Quality Assurance Program

CRITERION 8 - INSPECTION AND ACCEPTANCE TESTING

ED-12-6003	Startup and Systems Operability Test Procedure
FD-1000	Sitewide CERCLA Quality Assurance Project Plan (SCQ)
QA-0005	Inspection of Procured Material, Equipment, Work in Process, and Completed Items
RM-0012	Quality Assurance Program

CRITERION 9 - MANAGEMENT ASSESSMENT

CT 1.7.0	Construction Division Management Assessment Program
CT 2.3.5	Construction Testing
ED-12-9003	Environmental Engineering and Technology Self-Assessment Programs
ED-12-9005	Configuration Management Functional Area Assessment
EP-0002	Reviewing the FERNALD Site Environmental Monitoring Program
NS-0003	Safety Assessment Hazards Screening and Classification
OP-0102	Facility Safety Assessment Program (FSAP)
OP-1002	Shift Routines and Operating Practices
QA-0014	Management Assessment
RM-0012	Quality Assurance Program

CRITERION 10 - INDEPENDENT ASSESSMENT

CT 2.3.4	Audit Coordination
CT 3.2.0	Verification of Construction Subcontractor Work
CT 3.4.2	QA and QC Coordination
MS-1004	Establishing an Independent Safety Review Committee (ISRC) and Conducting Independent Safety Reviews
QA-0004	FEMP Quality Assurance Audit Program
QA-0007	Conduct of Independent Surveillance Activity
RM-0012	Quality Assurance Program

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